

IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A graphics processor comprising:  
a shading processing section which subjects pixel data to a shading process;  
a first path which permits map data and texture data output from a video memory to be input to the shading processing section;  
a second path which permits pixel data output from the shading processing section to be output to the video memory; and  
a third path which permits pixel data output from a pixel expanding section to be input to the shading processing section ~~and permits pixel data output from the video memory to be input to the shading processing section instead of the above pixel data; and~~  
a fourth path which permits pixel data output from the video memory to be input to the shading processing section.

Claim 2 (Original): The graphics processor according to claim 1, further comprising a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information.

Claim 3 (Original): The graphics processor according to claim 2, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 4 (Original): The graphics processor according to claim 2, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 5 (Original): The graphics processor according to claim 2, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 6 (Original): The graphics processor according to claim 2, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 7 (Original): The graphics processor according to claim 6, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 8 (Original): The graphics processor according to claim 6, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 9 (Original): The graphics processor according to claim 6, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 10 (Original): A graphics processor comprising:  
a shading processing section which subjects pixel data to a shading process;  
a first path which permits map data and texture data output from a video memory to be input to the shading processing section;  
a second path which permits pixel data output from the shading processing section to be output to the video memory; and  
a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information.

Claim 11 (Original): The graphics processor according to claim 10, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 12 (Original): The graphics processor according to claim 10, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 13 (Original): The graphics processor according to claim 10, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 14 (Original): The graphics processor according to claim 10, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 15 (Original): The graphics processor according to claim 14, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 16 (Original): The graphics processor according to claim 14, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 17 (Original): The graphics processor according to claim 14, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 18 (Currently Amended): A graphics card comprising:  
a first connector which can be connected to an electronic device;

a pixel expanding section which receives image display data via the first connector and expands the image display data into pixels to create pixel data;

a shading processing section which subjects the pixel data to a shading process;

a video memory;

a first path which permits map data and texture data output from the video memory to be input to the shading processing section;

a second path which permits pixel data output from the shading processing section to be output to the video memory;

a third path which permits pixel data output from the pixel expanding section to be input to the shading processing section and ~~permits pixel data output from the video memory to be input to the shading processing section instead of the above pixel data;~~

a fourth path which permits pixel data output from the video memory to be input to the shading processing section;

a D/A converter which converts a screen image output from the video memory into a video signal; and

a second connector which can connect an output of the D/A converter to a display unit.

Claim 19 (Original): The graphics card according to claim 18, further comprising a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information.

Claim 20 (Original): The graphics card according to claim 19, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 21 (Original): The graphics card according to claim 19, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 22 (Original): The graphics card according to claim 19, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 23 (Original): The graphics card according to claim 19, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 24 (Original): The graphics card according to claim 23, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 25 (Original): The graphics card according to claim 23, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 26 (Original): The graphics card according to claim 23, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 27 (Original): A graphics card comprising:  
a first connector which can be connected to an electronic device;  
a pixel expanding section which receives image display data via the first connector and expands the image display data into pixels to create pixel data;  
a shading processing section which subjects the pixel data to a shading process;  
a video memory;

a first path which permits map data and texture data output from the video memory to be input to the shading processing section;

a second path which permits pixel data output from the shading processing section to be output to the video memory;

a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information;

a D/A converter which converts a screen image output from the video memory into a video signal; and

a second connector which can connect an output of the D/A converter to a display unit.

Claim 28 (Original): The graphics card according to claim 27, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 29 (Original): The graphics card according to claim 27, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 30 (Original): The graphics card according to claim 27, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 31 (Original): The graphics card according to claim 27, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 32 (Original): The graphics card according to claim 31, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 33 (Original): The graphics card according to claim 31, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 34 (Original): The graphics card according to claim 31, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 35 (Currently Amended): A graphics processing system comprising:  
an interface bus which can be connected to a peripheral device;  
a CPU;  
a bus bridge connected to the interface bus and CPU;  
a pixel expanding section which receives image display data via the bus bridge and expands the image display data into pixels to create pixel data;  
a shading processing section which subjects the pixel data to a shading process;  
a video memory;  
a first path which permits map data and texture data output from the video memory to be input to the shading processing section;  
a second path which permits pixel data output from the shading processing section to be output to the video memory;  
a third path which permits pixel data output from the pixel expanding section to be input to the shading processing section; ~~and permits pixel data output from the video memory to be input to the shading processing section instead of the above pixel data; and~~  
a fourth path which permits pixel data output from the video memory to be input to the shading processing section; and

a D/A converter which converts pixel data output from the video memory into a video signal.

Claim 36 (Original): The graphics processing system according to claim 35, further comprising a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information.

Claim 37 (Original): The graphics processing system according to claim 36, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 38 (Original): The graphics processing system according to claim 36, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 39 (Original): The graphics processing system according to claim 36, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 40 (Original): The graphics processing system according to claim 36, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 41 (Original): The graphics processing system according to claim 40, wherein the write address calculation information contains information corresponding to a pixel expanding system.



Claim 42 (Original): The graphics processing system according to claim 40, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 43 (Original): The graphics processing system according to claim 40, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 44 (Original): A graphics processing system comprising:  
an interface bus which can be connected to a peripheral device;  
a CPU;  
a bus bridge connected to the interface bus and CPU;  
a pixel expanding section which receives image display data via the bus bridge and expands the image display data into pixels to create pixel data;  
a shading processing section which subjects the pixel data to a shading process;  
a video memory;  
a first path which permits map data and texture data output from the video memory to be input to the shading processing section;  
a second path which permits pixel data output from the shading processing section to be output to the video memory;  
a write address calculating section which calculates a write address of pixel data output from the shading processing section with respect to the video memory according to write address calculation information; and  
a D/A converter which converts pixel data output from the video memory into a video signal.

Claim 45 (Original): The graphics processing system according to claim 44, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 46 (Original): The graphics processing system according to claim 44, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 47 (Original): The graphics processing system according to claim 44, wherein the write address calculation information contains information which indicates the depth of a pixel.

Claim 48 (Original): The graphics processing system according to claim 44, wherein the write address calculation information is attached to an output of the shading processing section.

Claim 49 (Original): The graphics processing system according to claim 48, wherein the write address calculation information contains information corresponding to a pixel expanding system.

Claim 50 (Original): The graphics processing system according to claim 48, wherein the write address calculation information contains information which indicates a position of an environment map.

Claim 51 (Original): The graphics processing system according to claim 48, wherein the write address calculation information contains information which indicates the depth of a pixel.